



Equity measurement for Massachusetts' 2022-2024 Energy Efficiency Plan

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Applied Economics Clinic

Prepared on behalf of the Green Justice Coalition

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Executive Summary

Massachusetts is a national leader in energy efficiency and has made a commitment to ensuring that the benefits of energy efficiency programming are more equitable in the future than they have been in the past. As more affluent suburbs with single-family homes have accessed the Commonwealth's energy efficiency programming at higher rates, underserved communities with high proportions of lower income households and renters have lagged behind. Massachusetts energy efficiency program administrators have the potential to level the playing field by targeting programs to underserved communities and being transparent about their progress.

Accurate, thorough and prompt reporting of key metrics is essential to achieving success in serving vulnerable communities that have so far been left out of energy efficiency benefits. The interconnected nature of access, vulnerabilities, and marginalization—such as income or English-language isolation—create overlapping and interdependent challenges that require creative solutions from service providers. A just energy efficiency program acknowledges and explicitly addresses the way that intersectionality impacts awareness of, access to, and the benefits and burdens that result from energy efficiency programs. Equity metrics help ensure accountability to equity goals by ensuring that progress is measured, tracked, and communicated publicly. Without actionable metrics to measure progress, it is impossible to know whether energy efficiency programming is improving with regard to serving historically underserved communities.

This Applied Economics Clinic white paper—prepared on behalf of the Green Justice Coalition—builds on the equity recommendations of the Energy Efficiency Advisory Council's (EEAC) Equity Working Group (EWG) and Green Justice Coalition (GJC) for the 2022-2024 Three-Year Energy Efficiency Plan (attached as Appendices A and B), by providing recommendations for how to measure progress towards these goals.

To build on progress made to-date, the Commonwealth must measure equity in energy efficiency in a meaningful way using specific metrics related to each of six policy priority areas:

1. Targeting efficiency benefits at underserved communities, vulnerable, and historically marginalized;
2. Ensuring that efficiency programs are simple to use and language-appropriate;
3. Making efficiency data more detailed and transparent;
4. Ensuring that efficiency creates opportunities for a just, green transition;
5. Ensuring efficiency efforts are aligned with broader climate goals; and
6. Ensuring that the people involved in efficiency efforts are representative of the communities that comprise the Commonwealth.

This Applied Economics Clinic (AEC) white paper serves as a companion to two other AEC white papers: one that provides examples from elsewhere in the United States of equity in energy efficiency programming, and another that examines Massachusetts towns identified as underserved and the 38 towns newly identified for targeted equity investments by the Massachusetts energy efficiency program administrators, the EWG and the EEAC.

Table ES-1. Policy priorities and recommended equity metrics

1. Make it Targeted	
A. Identify communities to target	Metric 1.A.i: Collect key data and create thresholds for communities to target
	Metric 1.A.ii: Create and maintain a list of communities to target
B. Direct additional resources to target communities	Metric 1.B.i: Collect detailed participation data and establish participation goals in target communities
	Metric 1.B.ii: Designate and track budget and savings goals in target communities
	Metric 1.B.iii: Create and track new incentives for target communities
	Metric 1.B.iv: Mandate quarterly reporting for target communities
C. Try new methods to reach target communities	Metric 1.C.i: Develop, pilot, implement and track alternative strategies
	Metric 1.C.ii: Offer, implement, and track diversity incentives for workforce development
2. Make it Simple	
A. Expand low- and moderate-income eligibility thresholds, and track related changes in eligibility and program participation	Metric 2.A.i: Revise and report on income-qualification standard
B. Revise the income verification process	Metric 2.B.i: Allow automatic income verification, and track related changes in eligibility and program participation
	Metric 2.B.ii: Allow self-verification of income and track related changes in eligibility and program participation
C. Provide streamlined services	Metric 2.C.i: Establish seamless, integrated participation mechanisms, and track related changes in eligibility and program participation
	Metric 2.C.ii: Employ “closers” and track related changes in measure implementation
D. Enhance landlord/renter participation incentives	Metric 2.D.i: Provide referral incentives and track related changes in landlord/renter participation
	Metric 2.D.ii: Offer energy efficiency alongside other building upgrades and track related changes in landlord/renter participation
	Metric 2.D.iii: Develop marketing and outreach strategies and track related changes in landlord/renter participation
E. Enhance language availability and access	Metric 2.E.i: Provide a greater number of languages for all Mass Save information and track language availability
	Metric 2.E.ii: Establish and distribute written language access policy and track related changes in English-limited participation
	Metric 2.E.iii: Provide language access training and track related changes in non-English language program participation
	Metric 2.E.iv: Establish language support mechanisms and track language availability among participating vendors
	Metric 2.E.v: Language-isolated community outreach and track related changes in language-isolated program participation
3. Make it Transparent	
A. Reporting standards	Metric 3.A.i: Set and report on implementation of standards-setting metrics
B. Training opportunities	Metric 3.B.ii: Track training opportunity data
C. Internships	Metric 3.C.i: Track job offer data
D. Customer experience	Metric 3.D.i: Create and report customer journey maps
E. Underserved customer groups	Metric 3.E.i: Collect and report disaggregated data for existing data points
	Metric 3.E.ii: Expand program performance reporting
	Metric 3.E.iii: Report outcomes relative to goals

4. Make it Just	
A. Program administrators should work with community groups in underserved communities	Metric 4.A.i: Identify and make a public list of local, statewide and regional groups that work within underserved communities
	Metric 4.A.ii: Connect with identified community-based groups and track outreach efforts and outcomes
	Metric 4.A.iii: Track and publicly report communication with community-based groups
	Metric 4.A.iv: Provide and track compensation for community representative work
	Metric 4.A.v: Allocate and provide resources for community groups and track annual funding
B. Target training and workforce opportunities to vulnerability hotspots	Metric 4.B.i: Provide and track multilingual training opportunities and workforce development
	Metric 4.B.ii: Target and track support for workforce development efforts in underserved communities
	Metric 4.B.iii: Expand outreach and education about career opportunities and track related changes in education, training, internship, apprenticeship, and early career programs
	Metric 4.B.iv: Allocate funding for internships, apprenticeships, pre-apprenticeships, and externships and track related changes in these opportunities
5. Make it Climate Conscious	
A. Expand program targets	Metric 5.A.i: Align targets with policy and track progress towards targets and the contribution to Commonwealth policy goals
	Metric 5.A.ii: Set and track storage capacity targets
	Metric 5.A.iii: Set more efficient appliance standards, offer no-cost incentives for income-qualifying customers, and track related changes in appliance efficiency and income-eligible participation
B. Set aside funds for pre-electrification and weatherization	Metric 5.B.i: Allocate specific funding for low- and moderate-income pre-electrification and weatherization and track annual funding and related changes in pre-electrification and weatherization measure participation
C. Report disaggregated emissions data	Metric 5.C.i: Set, track, and report emission reduction targets by measure, sector, and customer type
6. Make it Representative	
A. Enhance vendor diversity	Metric 6.A.i: Require and track vendor partnerships with Disadvantaged Business Enterprises
	Metric 6.A.ii: Set and track minimum diversity, equity, and inclusion standards
	Metric 6.A.iii: Identify new firms for DBE and/or small business certification and track new DBE firms
B. Enhance diverse community partnerships	Metric 6.B.i: Establish and track diversity criteria for program administrator-community partnership goals

Table of Contents

Introduction	6
1) Make It Targeted.....	6
2) Make It Simple	9
3) Make It Transparent.....	13
4) Make It Just	16
5) Make It Climate Conscious.....	19
6) Make It Representative.....	21
Appendix A: EEACH EWG Recommendations	24
Appendix B: GJC Recommendations	31

About the Applied Economics Clinic

Based in Arlington, Massachusetts, the Applied Economics Clinic (AEC) is a mission-based non-profit consulting group that offers expert services in the areas of energy, environment, consumer protection, and equity from seasoned professionals while providing on-the-job training to the next generation of technical experts.

AEC’s non-profit status allows us to provide lower-cost services than most consultancies and when we receive foundation grants, AEC also offers services on a pro bono basis. AEC’s clients are primarily public interest organizations—non-profits, government agencies, and green business associations—who work on issues related to AEC’s areas of expertise. Our work products include expert testimony, analysis, modeling, policy briefs, and reports, on topics including energy and emissions forecasting, economic assessment of proposed infrastructure plans, and research on cutting-edge, flexible energy system resources.

Founded by Clinic Director and Senior Economist Elizabeth A. Stanton, PhD in 2017, AEC’s talented researchers and analysts provide a unique service-minded consulting experience. Dr. Stanton has had two decades of professional experience as a political and environmental economist leading numerous studies on environmental regulation, alternatives to fossil fuel infrastructure, and local and upstream emissions analysis. AEC professional staff includes experts in electric, multi-sector and economic systems modeling, climate and emissions analysis, green technologies, and translating technical information for a general audience. AEC’s staff are committed to addressing climate change and environmental injustice in all its forms through diligent, transparent, and comprehensible research and analysis.

Introduction

Massachusetts energy efficiency program administrators have the potential to level the playing field by targeting programs to underserved communities and being transparent about their progress. Accurate, thorough and prompt reporting of key metrics is essential to achieving success in serving vulnerable communities that have so far been left out of energy efficiency benefits. Equity metrics help ensure accountability to equity goals by ensuring that progress is measured, tracked, and communicated publicly. Without actionable metrics to measure progress, it is impossible to know whether energy efficiency programming is improving with regard to serving historically underserved communities.

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To build on progress made to-date, the Commonwealth must measure equity in energy efficiency in a meaningful way using specific metrics related to each of six policy priority areas:

1. Targeting efficiency benefits at underserved communities, vulnerable, and historically marginalized;
2. Ensuring that efficiency programs are simple to use and language-appropriate;
3. Making efficiency data more detailed and transparent;
4. Ensuring that efficiency creates opportunities for a just, green transition;
5. Ensuring efficiency efforts are aligned with broader climate goals; and
6. Ensuring that the people involved in efficiency efforts are representative of the communities that comprise the Commonwealth.

1) Make It Targeted

Energy efficiency programming enhances equity when it (1) targets and (2) allocates additional resources to underserved, vulnerable, and historically marginalized communities, such as: towns and cities with low participation rates in Mass Save, environmental justice communities, low- and moderate- income communities, communities disproportionately impacted by COVID, and language-isolated communities.

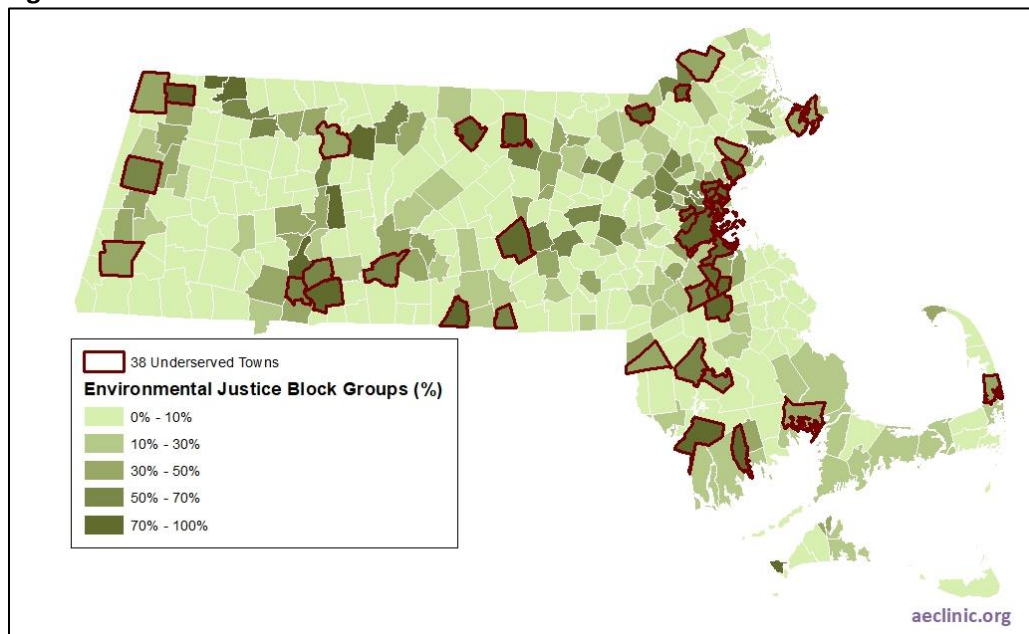
Low program participation is a challenge to be solved, not a permanent condition or a community characteristic. Massachusetts has taken an important first step in identifying which communities are least likely to be included in efficiency programs by contracting a study—*The Residential Nonparticipant Market Characterization and Barriers Study*—to identify relationships between efficiency program non-participants and characteristics like renter status, income and English language capacity as well as

Low program participation is a challenge to be solved, not a permanent condition or a community characteristic.

common barriers to participation.¹ Massachusetts has also begun the process of identifying solutions to nonparticipation through the EEAC EWG. The program administrators' 2022-2024 energy efficiency plan needs to incorporate detailed, targeted efforts for specific neighborhoods and communities, including specific budget allocations, to: implement the EWG's recommendations, track the impact of those solutions, and iterate until all communities—and especially historically underserved communities—are reached.

In an effort to ensure that efficiency benefits are more equitably distributed in the future, Massachusetts energy efficiency program administrators have identified 38 underserved towns—in which 69 percent of all communities are Environmental justice communities and which represent 38 percent of the Commonwealth's total population—to target in their 2022-2024 *Three-Year Plan* (see Figure 1; see AEC's companion white paper *Targeting underserved communities in Massachusetts' 2022-2024 Energy Efficiency Plan*² for more discussion of the 38 underserved towns).

Figure 1. Underserved towns



To target energy efficiency programs at those who need them most, the following actionable metrics should be adopted and made publicly available:

¹ Navigant, Illume, Cadeo. February 27, 2020. "Residential Nonparticipant Market Characterization and Barriers Study." Prepared for The Electric and Gas Program Administrators Of Massachusetts Part of the Residential Evaluation Program Area. Available at: https://ma-eeac.org/wp-content/uploads/MA19R04-A-NP-Nonpart-MarketBarriersStudy_Final.pdf.

² Woods, B. and E.A. Stanton. 2021. "Energy efficiency and equity efforts nationwide: Examples of equity-related energy and climate programming to inform Massachusetts' 2022-2024 Energy Efficiency Plan." *Applied Economics Clinic*. AEC-2021-12-01-WP. Available at : <https://aeclinic.org/publicationpages/2021/12/3/equity-2022-24-massachusetts-three-year-plan>

- A. Identify communities to target:** to identify vulnerable communities and communities that have not historically participated in Mass Save programs

Metric 1.A.i: Collect key data and create thresholds for communities to target: Use quantitative information and data analysis to determine geographic areas and population groups that should be targeted, including: history of underservice; COVID-impacts; share of renters; share of small businesses; income levels; energy burdens; language and English-language isolation; race/ethnicity; and environmental burdens. Set thresholds for each of these criteria to determine whether or not a community is included in the list to be targeted.

Metric 1.A.ii: Create and maintain a list of communities to target: Using quantitative thresholds established above. Add or remove communities from the list as needed on an annual basis.

- B. Direct additional resources to target communities:** to better serve communities that have not historically participated in Mass Save programs and vulnerable communities

Metric 1.B.i: Collect detailed participation data and establish participation goals in target communities: Collect energy efficiency program participation data paired with key household characteristics, including income, renter status, and language capabilities. Set numerical goals for increased participation among target communities such as low- and moderate-income households, renters and landlords, language-isolated communities, small businesses, and energy-burdened households.

Metric 1.B.ii: Designate and track budget and savings goals in target communities: Allocate specific budgets by community type, set energy savings goals (with specific measures) for target communities and collect and publicly report quarterly data on the status of each goal and measure.

Metric 1.B.iii: Create and track new incentives for target communities: Craft performance incentive mechanisms for DPU approval that will emphasize equity by serving target communities and enhance opportunities for deeper savings in target communities. Track and publicly report the utilization of these incentives by community type each quarter.

Metric 1.B.iv: Mandate quarterly reporting for target communities: Program administrators should report on participation rates, incentives offered, measures adopted, customer costs, budget spent, and savings achieved among target communities on a quarterly basis.

- C. Try new methods to reach target communities:** to overcome barriers that have impeded equitable program participation in the past

Metric 1.C.i: Develop, pilot, implement and track alternative strategies: Use multiple strategies to reach target communities. For example, recruit more renter participants through landlord associations or partner with trusted community-based organizations to increase participation in target communities. Track and publicly report the status and outcomes of these new strategies by community type.

Metric 1.C.ii: Offer, implement, and track diversity incentives for workforce development: Partner with employers to offer wage subsidies for new entrants into the energy efficiency workforce that include bonuses for more diverse recruitment in internship and apprenticeship opportunities.

2) Make It Simple

Energy efficiency programming enhances equity when it makes it simple to receive benefits by:

- streamlining eligibility processes,
- streamlining onboarding, initial audits, and measure implementation, and
- offering programs to more and different types of underserved, vulnerable and marginalized communities.

Equity in energy efficiency access cannot be achieved if efforts to enhance language equity are limited to creating more points of contact in more languages. Important ways to make efficiency programs simpler include streamlining the process by using a “quarter-backing” approach or single point of contact for program application, home assessment, and measure implementation. Language is another critical barrier to many households’ and businesses’ program participation: Massachusetts’ program administrators’ February 2020 analysis found that nonparticipants were more likely to be English isolated. Offering full “quarter-backing” of program services in more of the languages of the Commonwealth—such as Mandarin, Cantonese and Haitian Creole³—would make participation more accessible. (At present, brochures for income-eligible energy assistance programs are available in English, Spanish, Russian, Hindi, Chinese, Urdu, Vietnamese, Haitian Creole, Verdian, and Portuguese. Massachusetts’ program administrators’ website can be viewed in English, Spanish and Portuguese, the MassSave application helpline is available in English, Spanish, Portuguese, and Russian, but the online application portal is only available in English.)

Massachusetts has one of the most restrictive low-income energy efficiency qualification standards in the country.

Eligibility requirements for low- and moderate-income program benefits can also prevent efficiency measures from getting to the communities that need them most. At least nine states require that utilities offer low-income efficiency programs, but what it means to be low-income varies by state and can depend on the federal poverty level, the state median income, or both (see Table 1 below). These variations lead to a wide range of low-income thresholds for energy efficiency programs; ranging from about \$30,000 to almost \$78,000 per year for the average household.⁴ Massachusetts has one of the most restrictive low-income energy efficiency qualification standards in the country: to qualify as low-

³ United States Census Bureau. N.d. “2019: ACS 5-Year Estimates. Languages spoken at home.” Available at: https://data.census.gov/cedsci/table?q=United%20States&t=Language%20Spoken%20at%20Home&g=0100000US_0400000US25&tid=ACST1Y2019.S1601.

⁴ For states using the federal poverty threshold, the poverty line for a family of four with two children was used to represent the average family.

income, households must earn 60 percent or less of state median income—Massachusetts median income is \$86,000, so households must earn less than \$56,000 to qualify as low income, regardless of the size of the household. Other states allow households to qualify as low-income at 80 percent or less

Table 1. Low-income (“LI”) energy efficiency program qualifications by state

State	Utility	Low-Income Qualifier
CA	PG&E, SCE, SOCALGAS, AND SDG&E	80% of Area Median Income or below 200% of Federal Poverty Guidelines
CO	Xcel	150% Federal Poverty Level or 60% State Median Income
	Black Hills	
CT	Eversource	60% State Median Income
	United	
IL	Ameren	300% Federal Poverty Level
	ComEd	80% Area Median Income
MA	Eversource	60% State Median Income
	National Grid	
MI	DTE	200% Federal Poverty Level
	Consumers	
MN	Xcel	110% Federal Poverty Level or 50% State Median Income, whichever is greater
NJ	All utilities	250% of Federal Poverty Level
NY	All utilities	60% or less of State Median Income

Sources: 1) ACEEE. "Guidelines for Low-income Energy Efficiency Programs." Available at: <https://database.aceee.org/state/guidelines-low-income-programs>; 2) State of California. n.d. Low-Income Weatherization Program. Available at: <https://www.energyefficiencyforall.org/resources/california-low-income-weatherization-program/>; 3) State of California. n.d. PG&E, SCE, SOCALGAS, AND SDG&E: Energy Savings Assistance (ESA) Program. Available at: <https://www.energyefficiencyforall.org/resources/pg-and-e-sce-socialgas-and-sdq-and-e-energy-savings-assistance-esa-program/>; 4) Reames, T. G., Stacey, B., Zimmerman, M. April 2019. A Multi-State Analysis of Equity in Utility-Sponsored Energy Efficiency Investments for Residential Electric Customers. University of Michigan. Available at: https://poverty.umich.edu/files/2019/05/Energy_efficiency.pdf; 5) Commonwealth of Massachusetts. 2008 Green Communities Act. Available at: <https://malegislature.gov/Laws/SessionLaws/Acts/2008/Chapter169>; 6) Minnesota Legislature. 2021. Conference Committee Report on HF 164: A bill for an act relating to energy; establishing the Energy Conservation and Optimization Act of 2021. Available at: <https://www.revisor.mn.gov/bills/text.php?number=HF164&type=ccr&session=ls92&version=0>.

of area median income, which is more representative of local cost of living than statewide median income, or use a multiple of the federal poverty level as an income limit.

To make energy efficiency programs simple, the following actionable metrics should be adopted and reported on publicly:

- A. Expand low- and moderate-income eligibility thresholds, and track related changes in eligibility and program participation:** to make efficiency benefits more widely available to vulnerable households

Metric 2.A.i: Revise and report on income-qualification standard: Following programs in other states, the Commonwealth should raise the minimum income needed to qualify for low and moderate-income efficiency programs to be more reflective of local cost of living circumstances: for example, including households with incomes up to 80 percent of the state median income (for Massachusetts, \$65,000),⁵ taking household size into consideration in income eligibility, or using the 300 percent of federal poverty limit standard (for a family of four, \$80,000).⁶ Track and publicly report the status and outcomes of these new strategies by community type.

- B. Revise the income verification process:** to improve ease of access for low- and moderate-income customers

Metric 2.B.i: Allow automatic income verification, and track related changes in eligibility and program participation: Automatically qualify income-qualifying households in environmental justice communities and participants in other state income-qualified programs for participation in income-eligible energy efficiency programming and benefits. Track and publicly report the status and outcomes of these new strategies by community type.

Metric 2.B.ii: Allow self-verification of income and track related changes in eligibility and program participation: Simplify household-level income verification with audits. Track and publicly report the status and outcomes of these new strategies by community type.

- C. Provide streamlined services:** to offer a single point of contact to facilitate the entire efficiency program process, from audit to installation

Metric 2.C.i: Establish seamless, integrated participation mechanisms, and track related changes in eligibility and program participation: Establish single point of contact concierge services that reduce number of steps required to access offers, provide immediate pathways to take action, and

⁵ United States Census Bureau. N.d. "QuickFacts: Massachusetts." Available at: <https://www.census.gov/quickfacts/fact/table/MA/INC110219>

⁶ Office of the Assistant Secretary for Planning and Evaluation (ASPE). 2021. "U.S. Federal Poverty Guidelines Used to Determine Financial Eligibility for Certain Federal Programs." Available at: <https://aspe.hhs.gov/topics/poverty-economic-mobility/poverty-guidelines/prior-hhs-poverty-guidelines-federal-register-references/2021-poverty-guidelines>

direct connections to services and providers needed. Track and publicly report the status and outcomes of these new strategies by community type.

Metric 2.C.ii: Employ “closers” and track related changes in measure implementation: Employ “closers” who get paid to close efficiency upgrade projects, particularly in multi-family buildings. Track and publicly report the number of households that move from audits through measure implementation.

D. Enhance landlord/renter participation incentives: to better reach underserved renter communities

Metric 2.D.i: Provide referral incentives and track related changes in landlord/renter participation: Offer monetary incentives for tenants who refer their landlords for efficiency upgrades. Track and publicly report the status and outcomes of these new strategies by community type, income level, and language capabilities.

Metric 2.D.ii: Offer energy efficiency alongside other building upgrades and track related changes in landlord/renter participation: Develop a marketing offer that combines energy efficiency and other building upgrades to attract more landlord participation. Track and publicly report the status and outcomes of these new strategies by community type, income level, and language capabilities.

Metric 2.D.iii: Develop marketing and outreach strategies and track related changes in landlord/renter participation: Develop marketing and outreach strategies in multiple languages for residential and commercial landlords to incentivize renters to participate. Track and publicly report the status and outcomes of these new strategies by community type, income level, and language capabilities.

E. Enhance language availability and access: to better reach English-limited households and communities.

Metric 2.E.i: Provide a greater number of languages for all Mass Save information and track language availability: Provide a greater number of languages for MassSave information including forms, websites, phone- and email-based assistance, and in-home evaluation and service. Languages to be offered include (but may not be limited to): English, Spanish, Portuguese, Mandarin, Cantonese, Haitian Creole, Vietnamese and Arabic.⁷ Track, publicly report, and publicize the languages available by type of information/service.

Metric 2.E.ii: Establish and distribute written language access policy and track related changes in English-limited participation: Establish a written language access policy that would be distributed to all customers, program administrators, and vendors specifying which languages are currently available and establishing the right to request no-cost translation services as needed. Track and

⁷ United States Census Bureau. N.d. “2019: ACS 5-Year Estimates. Languages spoken at home.” Available at: <https://data.census.gov/cedsci/table?q=United%20States&t=Language%20Spoken%20at%20Home&g=0100000US0400000US25&tid=ACST1Y2019.S1601>.

publicly report related changes in program participation among English-limited populations.

Metric 2.E.iii: Provide language access training and track related changes in non-English language program participation: Provide regular training on language access for all program administrators and vendors to keep them up-to-date on language availability and language access rights and options. Track and publicly report related changes in non-English program participation.

Metric 2.E.iv: Establish language support mechanisms and track language availability among participating vendors: Create mechanisms for easy and equitable sharing of language support, including a moratorium of understanding (MOU) across program administrators, lead vendors, subcontractors and regularly updated template for program administrator and vendor access language support. Track and publicly report related changes in language availability among vendors participating in MassSave programs.

Metric 2.E.v: Language-isolated community outreach and track related changes in language-isolated program participation: Collaborate with community-based organizations serving language-isolated communities to standardize and socialize common industry terms and enhance awareness of language availability and access options. Track and publicly report related changes in program participation among language-isolated communities.

3) Make It Transparent

Energy efficiency programming enhances equity when detailed information regarding the distribution of measures, savings, benefits, spending, emission reductions, energy burdens, workforce development and training opportunities, and customer experiences is transparent and accessible to the public. The 2020 *Residential Nonparticipant Market Characterization and Barriers Study* made it clear that Massachusetts' energy efficiency benefits are not distributed equitably. The study found lower participation rates among renters, low- and moderate-income households, households without a college degree, residents in buildings with 3 to 9 units, and non-English speaking customers and that households that do not participate in energy efficiency programs are less likely to be aware of them, to understand them, to trust them, and to have the time or resources to prioritize them.⁸

More data reporting is needed to shed light on which communities should be prioritized in allocating measures and efficiency savings and how those communities are receiving the measures and savings being targeted to them. Solving the problem of ensuring that vulnerable communities receive their fair share of efficiency benefits will require transparent reporting that tracks benefits in the specific communities that are underserved and publicly reports on energy efficiency program performance at a more detailed level of data disaggregation.

⁸ Navigant. February 2020. "Residential Nonparticipant Market Characterization and Barriers Study." *Prepared for MA EEAC and the Mass Save Program Administrators*. Available at: <https://illumeadvising.com/files/Residential-Nonparticipant-Market-Characterization-and-Barriers-Study.pdf>.

Table 2. Summary results of the Navigant 2020 Residential Nonparticipant Market Characterization and Barriers Study

	Participants	Non-Participants
Speak a language other than English	20%	25%
Renter	26%	34%
Are moderate income	12%	14%
Are low income	34%	39%
At least one child under 18 years	28%	29%
Single family home	61%	59%
2 unit building	11%	11%
3-9 unit building	11%	22%
10+ unit building	17%	5%
Mobile home or other	2%	3%
High school or less education	20%	29%
Unaware of Mass Save/income-eligible programs	15%	28%
Participate in assistance program	30%	31%

Note: Red shading indicates the higher percentage, green shading indicates the lower percentage, and grey shading indicates an equal percentage.

Source: Adapted from Navigant. February 2020. "Residential Nonparticipant Market Characterization and Barriers Study." Prepared for MA EEAC and the Mass Save Program Administrators. Available at:

<https://illumeadvising.com/files/Residential-Nonparticipant-Market-Characterization-and-Barriers-Study.pdf>.

As recommended by the GJC and EWG, efficiency program administrators should commit to leveling the playing field by providing a higher level of data disaggregation in publicly available efficiency program reporting. Data need to be disaggregated by as many categories of vulnerability as possible, but at a minimum, should include separate values presented for specific kinds of underserved customers like small businesses, renters, and language isolated populations. Data that should be disaggregated in this way include energy savings, emission reductions, efficiency savings and benefits, and program spending.

For use in equity reporting and evaluation, data need to be disaggregated by categories that correspond to vulnerabilities such as: a history of underservice, income level, energy burdens (energy costs as a share of household income), language isolation, race/ethnicity, and environmental burdens. Data also need to be reported at a city, town, and census block level as well as by vulnerability category. At a minimum, these data should be reported annually. Whenever possible, these data should be reported quarterly. For example: Fall River efficiency measures and savings broken out by income level or language spoken at home. Improved transparency would make it possible to better assess the equity impacts of Massachusetts' nation-leading energy efficiency programming and make improvements

Efficiency program administrators should commit to leveling the playing field by providing a higher level of data disaggregation in publicly available efficiency program reporting.

to ensure that its benefits are reaching households and communities in an equitable fashion.

To make energy efficiency programs transparent, the following actionable metrics should be adopted and made publicly available:

A. Reporting standards: Create a data collection and reporting standard for all program administrators

Metric 3.A.i: Set and report on implementation of standards-setting metrics: Energy efficiency program data collection and reporting standards should include data sharing agreements between program partners and program administrators. For example, program partners should be required to share data on program performance with program administrators at the most disaggregate level possible (while protecting consumer privacy) and program administrators should be required to share program performance data publicly at the most disaggregate level possible.

B. Training opportunities: Create and keep up-to-date a detailed list of all training opportunities available through or supported by Mass Save and make that list easily available to stakeholders and on the Mass Save website.

Metric 3.B.ii: Track training opportunity data: At present, there is no publicly available database of all training opportunities available through Mass Save—these data will need to be collected and maintained. Data to be tracked include identifying, compiling, keeping up-to-date and publicly sharing a list of training opportunities offered by anyone in the Mass Save network including program administrators and contractors that participate in Mass Save programs as well as contractors that are supported indirectly by Mass Save funding.

C. Internships: Track and report the number of Mass Save internships, pre-apprenticeships, apprenticeships, and externships that translate into full-time job offers.

Metric 3.C.i: Track job offer data: At present, there is no publicly available database of all job offers that come about due to internship and apprenticeship opportunities through Mass Save contractors or program administrators. These data are essential to understanding how often internship and apprenticeship opportunities translate into full-time careers for those who participate in them. Data to record on each job opportunity include the income level of the job offer, race/ethnicity and gender of employee being offered the job, and the job or worker location.

D. Customer experiences: Create detailed customer journey maps that illustrate individual experiences within income-eligible, residential, and commercial and industrial programs, and for different customer types, including owners, tenants, property owners and managers.

Metric 3.D.i: Create and report customer journey maps: Customer journey maps should be used to illustrate individual experiences of income-eligible, residential, and commercial and industrial participants in Mass Save programs as well as differentiating between different types of participants, including building owners and renters. In addition, customer journey map would catalog language assets available within the Mass Save network, identify language gaps that require

additional language options, translation, or interpretation and should be easy to understand and available in multiple languages.

- E. Underserved customer groups:** More frequent and detailed reporting of budget and participation by underserved customer groups including small businesses, language isolated populations, renters and landlords, low- and moderate-income customers, and racial minorities relative to allocated budgets and established numerical goals for increased participation among these groups.

Metric 3.E.i: Collect and report disaggregated data for existing data points: Separate small business from commercial and industrial existing building retrofit reporting. Separate low- and moderate-income from residential reporting. Report all other underserved customer groups separately, including small businesses, language-isolated populations, renters and landlords, low- and moderate-income customers, and racial-ethnic minorities.

Metric 3.E.ii: Expand program performance reporting: Gather, track, and report customer language preference and language of program participants. Report renter participation quarterly. Provide regular information on barriers to weatherization in Massachusetts programs. Track and report on baseline workforce levels for vendors and employees by relevant racial-ethnic and/or cultural categories and at least annually report on progress over time. Report the number of property owners/landlords receiving enhanced insulation incentives.

Metric 3.E.iii: Report outcomes relative to goals: Report actual budget, participation, savings, and costs relative to program administrator goals, such as the number of affected projects and units in the multifamily program relative to the numerical goal or the budget, savings and participation for small rental properties (5-25 units) relative to goals.

4) Make It Just

Energy efficiency programming enhances equity when its implementation helps redress past harms, creates new relationships of power, assures representative diversity in related jobs and procurement, provides diversity-enhancing job training, and takes action to guard against efficiency improvements that price historically marginalized households out of their neighborhoods. Characteristics like race, income, English-language isolation, and immigration status overlap and intersect with one another in ways that create interdependent vulnerabilities. For example, a low-income, English-speaking household is vulnerable to high energy costs but a low-income, English-isolated household is vulnerable to high energy costs *and* less likely to be able to access and/or find translated materials on energy assistance programs. Acknowledging and explicitly addressing the way that intersectionality impacts awareness of, access to, and the benefits and burdens that result from energy efficiency programs is a vital component of a just approach to energy efficiency in the Commonwealth.

Acknowledging and explicitly addressing the way that intersectionality impacts awareness of, access to, and the benefits and burdens that result from energy efficiency programs is a vital component of a just approach to energy efficiency.

Efforts towards diversifying Massachusetts' energy efficiency workforce need to target underserved, vulnerable, and historically marginalized communities, be made concrete in contractual agreements, track job training program outcomes and report publicly on their performance, and develop and maintain a multilingual workforce. It is also essential that energy efficiency and electrification improvements do not cause property value, property tax, and rent increases that make it difficult or impossible for low-and moderate-income households and small businesses to stay in their homes or buildings. A 2017 Iowa State University study of the impact of energy efficiency on rent levels in various U.S. cities found that rents were 6 to 14 percent higher for properties with

energy efficient features.⁹ A 2020 report by the Urban Displacement Project and UC Berkeley Center for Community Innovation found that “regardless of geography or climate, the value of a property increases with the addition of energy efficiency measures” and that higher rents can lead to displacement, particularly when utility bill savings are not large enough to offset rent increases.¹⁰

To make energy efficiency programs just, the following actionable metrics should be adopted, tracked and reported on publicly:

- A. Program administrators should work with community groups in underserved communities:** to identify community needs, enhance communication and build trust with underserved communities, and provide resources

Metric 4.A.i: Identify and make a public list of local, statewide and regional groups that work within underserved communities: Such as low-income and language-isolated communities. Prioritize community groups that focus equity and diversity issues for inclusion in the list. Make the list of identified groups publicly available and update the list at least once per year.

Metric 4.A.ii: Connect with identified community-based groups and track outreach efforts and outcomes: Program administrators should conduct outreach with representatives of identified community-based groups to develop relationships. Track and report publicly on outreach efforts with community-based groups and outreach outcomes.

⁹ Im, J., Seo, Y., Cetin, K.S., and Singh, J. 2017. “Energy efficiency in U.S. residential rental housing: Adoption rates and impact on rent.” *Applied Energy*, 205(2017), p. 1021-1033. Available at: <https://www.ccee.iastate.edu/kcetin/files/2018/01/Cetin-2017-Adoption-rates-in-Rental-Housing.pdf>.

¹⁰ Cash, A., et al. 2020. “Climate Change and Displacement in the U.S. – A Review of the Literature.” *U.C. Berkeley Center for Housing Innovation and Urban Displacement Project*. Prepared for Strong, Prosperous, and Resilient Communities Challenge (SPARCC). Available at: https://www.urbandisplacement.org/sites/default/files/images/climate_and_displacement_-_lit_review_6.19.2020.pdf. Page 38.

Metric 4.A.iii: Track and publicly report communication with community-based groups: Track and publicly report community-identified needs; inclusion of community leaders in goal-setting and program planning; outcomes of regular, two-way communication between community leaders and program administrators; and community feedback on language availability and culturally appropriate outreach/marketing.

Metric 4.A.iv: Provide and track compensation for community representative work: Compensate community leaders for their time, experience, and knowledge. Track and publicly report compensation information, including available amounts and amounts paid out, and share it with community group representatives at the time of initial outreach.

Metric 4.A.v: Allocate and provide resources for community groups and track annual funding: Allocate and provide resources to community groups on a sustained basis (i.e. allocate and provide annual funding) to achieve mutual energy efficiency objectives, such as financial incentives for lead generation and conversion. Track and publicly report resource allocation and how resource allocations were utilized.

- B. Target training and workforce opportunities to vulnerability hotspots:** to enhance the diversity of the Commonwealth's efficiency workforce and provide training and work opportunities in vulnerable communities and communities that have historically been underserved by Mass Save

Metric 4.B.i: Provide and track multilingual training opportunities and workforce development: Track training and workforce development opportunities and commit to providing publicly available updates that include information on diversity.

Metric 4.B.ii: Target and track support for workforce development efforts in underserved communities: Identify communities to target for workforce development efforts and training opportunities, such as environmental justice communities, English-isolated communities, and communities with historically low participation in Mass Save programs. Transparently and publicly communicate how those communities will be targeted. Track and publicly report on efforts and outcomes.

Metric 4.B.iii: Expand outreach and education about career opportunities and track related changes in education, training, internship, apprenticeship, and early career programs: Create stronger partnerships with vocational and technical high schools and community colleges, particularly in vulnerable communities. Establish energy efficiency career days where students and job-seekers can learn first-hand from energy efficiency workers about potential career pathways and career opportunities that are available to new entrants in the workforce. In outreach and education efforts, clearly communicate the connections between a career in energy efficiency and broader climate and environmental issues. Track and publicly report on efforts and outcomes, including participation in relevant education, training, internship, apprenticeship, and early career programs.

Metric 4.B.iv: Allocate funding for internships, apprenticeships, pre-apprenticeships, and externships and track related changes in these opportunities: Partner with employers to offer

partial wage subsidies for a limited time for new entrants into the energy efficiency workforce. Include mentorship and networking opportunities as a component of all internship, apprenticeship, pre-apprenticeship, and externship opportunities. Prioritize funding in vulnerable communities and transparently and publicly communicate how much funding those communities will be allocated. Track and publicly report on funding allocated by community type and related changes in participation in internship, apprenticeship, pre-apprenticeship, and externship opportunities.

5) Make It Climate Conscious

Energy efficiency programming enhances equity when climate, efficiency and equity goals are integrated together. *An Act Creating a Next-Generation Roadmap for Massachusetts Climate Policy*¹¹ sets new, strengthened requirements for emission reductions from energy efficiency programs, but fails to address the distribution of these emission reductions (and efficiency savings benefits) among towns, income-levels, race-ethnicities or other household or business characteristics.¹²

As demonstrated by the 2020 *Residential Nonparticipant Market Characterization and Barriers Study*, energy efficiency benefits are not distributed fairly or equitably across Massachusetts and—while emission savings data are currently only publicly available by total emissions saved (and not by measure, sector or customer type)—it seems plausible that the emission reductions from energy efficiency measures would be distributed similarly to their other benefits, such as energy cost savings or enhanced indoor comfort. Solving this problem will require better transparency by publicly reporting on energy efficiency program emission reductions by measure, sector, and customer type.

To continue providing energy savings and comply with new greenhouse gas emission reduction protocols, program administrators will have to serve low- and moderate-income households, renters, and small businesses, and will have to find new and creative ways to make these savings economic.

Energy savings from efficiency programs are disproportionately targeted to the biggest energy users where the cheapest dollar per kilowatt-hour (and dollar per ton of emissions) reductions can be achieved. This efficient and economical use of energy efficiency funds may have gotten energy efficiency programs off the ground, but it cannot get Massachusetts—or the states following in its footsteps—to the finish line, particularly when it comes to issues of equity. To continue providing energy savings and comply with new greenhouse gas emission reduction protocols, program administrators will have to serve low- and moderate-income households, renters, and small businesses, and will have

¹¹ The 192nd General Court of the Commonwealth of Massachusetts. January 19, 2021. Bill S.9. “An Act Creating a Next-Generation Roadmap for Massachusetts Climate Policy.” Available at: <https://malegislature.gov/bills/192/S9>.

¹² Massachusetts Executive Office of Energy and Environmental Affairs. July 15, 2021. “Greenhouse Gas Emissions Reduction Goal for Mass Save.” Available at: <https://ma-eeac.org/wp-content/uploads/2021-07-15-Mass-Save-GHG-Goal.pdf>. Page 3.

to find new and creative ways to make these savings economic.

To make energy efficiency programs more climate-conscious, the following actionable metrics should be adopted:

A. Expand program targets: to match the scope of the Commonwealth’s climate goals

Metric 5.A.i: Align targets with policy and track progress towards targets and the contribution to Commonwealth policy goals: For example, the Clean Energy and Climate Plan calls for a million homes to receive energy efficiency retrofits by 2030.¹³ To accomplish this goal, more than 100,000 homes per year must receive energy retrofits. The *2022-2024 Three-Year Statewide Energy Efficiency Plan* must set targets that align with the scale of action needed to meet the Commonwealth’s goals. Track and publicly report on targets set, alignment of targets with Commonwealth policy goals, progress made toward targets, and the contribution of targets to Commonwealth policy goals.

Metric 5.A.ii: Set and track storage capacity targets: Energy storage is a key way to build community resiliency. The *2022-2024 Three-Year Statewide Energy Efficiency Plan* should set specific storage capacity targets, including low-income specific targets to build resilience to extreme weather events in vulnerable communities and communities that have historically been underserved by Mass Save. Track and publicly report on targets set and progress towards targets, by community type.

Metric 5.A.iii: Set more efficient appliance standards, offer no-cost incentives for income-qualifying customers, and track related changes in appliance efficiency and income-eligible participation: Encourage the adoption of more efficient appliances by setting more efficient standards for Mass Save-supported appliances and offering no-cost incentives for income-qualifying customers. Track and publicly report on appliance efficiency standards, availability of no-cost incentives for income-eligible customers and related changes in appliance efficiency and income-eligible participation.

B. Set aside funds for pre-electrification and weatherization: for low- and moderate-income households and small businesses

Metric 5.B.i: Allocate specific funding for low- and moderate-income pre-electrification and weatherization and track annual funding and related changes in pre-electrification and weatherization measure participation: Achieving a fair distribution of emission reductions across the Commonwealth will not be possible without allocating specific funding for pre-electrification (including electric-system upgrades) and weatherization for low- and moderate-income households and small businesses, including roof repair, asbestos removal, and knob and tube wiring removal.

¹³ The Commonwealth of Massachusetts. December 30, 2020. “Interim Clean Energy and Climate Report for 2030.” Available at: <https://www.mass.gov/doc/interim-clean-energy-and-climate-plan-for-2030-december-30-2020/download>. Page 28.

Without these upgrades, these households will continue to have lower participation rates in energy efficiency programs. Track and publicly report on annual funding allocated for low- and moderate-income pre-electrification and weatherization as well as actual changes in pre-electrification and weatherization measure participation by community type.

- C. **Report disaggregated emissions data:** to be more transparent about the distribution of emission reductions

Metric 5.C.i: Set, track, and report emission reduction targets by measure, sector, and customer type: Program administrations must set emission reduction targets such that emission reductions will be equitably distributed across the Commonwealth. This will involve prioritizing underserved, vulnerable, and historically marginalized communities. Track and publicly report the status and outcomes of these new strategies by community type. Program administrators should report emission reductions by measure, sector, and customer type. Insofar as possible, emissions reductions should also be reported by town, income-level, race/ethnicities, or other household or business characteristics that would speak to the distribution of emission reductions across communities.

6) Make It Representative

Energy efficiency programming enhances equity when there is diverse representation in leadership positions—leadership that looks like the Commonwealth itself. Representative diversity would entail more diverse racial, language, income, and renter representation among decision-makers. Half of Massachusetts’ households make less than \$81,000,¹⁴ 30 percent make less than \$50,000, and 15 percent make less than \$25,000. Nearly a third of Bay Staters are people of color, more than 60 percent rent their homes, 17 percent were born outside of the United States, and 6 percent live in English-isolated households (see Figure 1). Decision-makers have the power to define both problems and solutions: When diverse representation is lacking, the lived experiences, outlooks, and viewpoints of certain populations are not being taken into account.

Leadership positions need to better represent the diversity of the Commonwealth, and underserved, vulnerable, and historically marginalized communities should have a voice as stakeholders and experts on their own needs and circumstances. The leaders that make decisions about Massachusetts energy efficiency are not 9 percent in poverty,¹⁵ 33 percent people of color, 61 percent renters, 17 percent immigrants, or 6 percent English-isolated. As one example, the National conference of State Legislatures

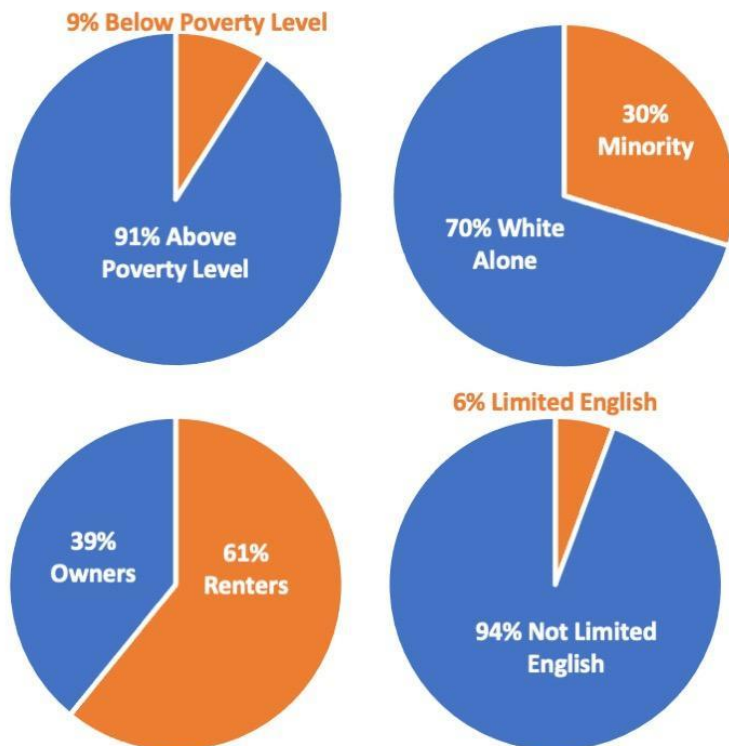
When diverse representation is lacking, the lived experiences, outlooks, and viewpoints of certain populations are not being taken into account.

¹⁴ United States Census Bureau. N.d. “QuickFacts: Massachusetts.” Available at: <https://www.census.gov/quickfacts/fact/table/MA/INC110219>.

¹⁵ United States Census Bureau. N.d. “QuickFacts: Massachusetts.” Available at: <https://www.census.gov/quickfacts/fact/table/MA/INC110219>.

collects data on legislatures. In 2015 (the last year for which data were collected) Massachusetts' legislators were 26 percent female-identifying and 8 percent people of color.¹⁶

Figure 1. Massachusetts population by (clockwise from top left): poverty level, race, English language, and home owner or renter



Source: US Census. 2019 American Community Survey 5-Year Estimates Subject Tables [Table: S1901]. Available at: <https://data.census.gov/cedsci/table?q=median%20income&q=0400000US25&tid=ACSST5Y2019.S1901&hidePreview=true&moe=false>.

Representative diversity among decision-makers and in positions of leadership should exist at all levels (for example, among state legislators), but for the purposes of enhancing equity in energy efficiency, it is particularly important that decision-makers from the following bodies are representative of the diversity of the Commonwealth: the EEAC, DPU commissioners, DOER senior staff, DOER's consultants to the EEAC process, and program administrators' senior staff (at the program and the utility level).

To make energy efficiency programs more representative, the following actionable metrics should be adopted:

- A. Enhance vendor diversity:** to ensure diverse business participation in Mass Save contract opportunities

¹⁶ National Conference of State Legislatures (NCSL). N.d. "Legislators by Generation." Available at: [HYPERLINK "https://www.ncsl.org/research/about-state-legislatures/who-we-elect-an-interactive-graphic.aspx"](https://www.ncsl.org/research/about-state-legislatures/who-we-elect-an-interactive-graphic.aspx)[https://www.ncsl.org/research/about-state-legislatures/who-we-elect-an-interactive-graphic.aspx#](https://www.ncsl.org/research/about-state-legislatures/who-we-elect-an-interactive-graphic.aspx).

Metric 6.A.i: Require and track vendor partnerships with Disadvantaged Business Enterprises:

Minimize the use of invite-only procurements and include certified Disadvantaged Business Enterprises (DBEs) in all request for proposals (RFP), request for qualifications (RFQ), and request for information (RFI) distribution lists. Require bidders to make measurable financial commitments to do business with one or more diverse businesses on all procurement opportunities with a value greater than \$150,000, and require lead vendors to partner with DBEs on all Mass Save contracts. Make the vendor selection criteria objective and transparent to avoid implicit bias. Host webinars and trainings, and provide technical assistance to help vendors navigate the procurement process. Track and publicly report on: certified DBEs included in RFP/RFQ/RFI distribution lists; financial commitments to DBE procurements; vendor/DBE partnerships; vendor selection criteria; and webinars, trainings, and technical assistance.

Metric 6.A.ii: Set and track minimum diversity, equity, and inclusion standards: for all Mass Save contracted vendors. Provide detailed technical assistance to vendors as they develop formal diversity, equity, and inclusion (DEI) standards. Track and publicly report on vendor DEI standards annually.

Metric 6.A.iii: Identify new firms for DBE and/or small business certification and track new DBE firms: Identify and support vendors to pursue diversity certification or small business certification. Track and publicly report on businesses identified for certification and how many businesses achieve certification on an annual basis.

B. Enhance diverse community partnerships: to better identify and meet the needs of vulnerable communities

Metric 6.B.i: Establish and track diversity criteria for program administrator-community partnership goals: Partnership goals should be specifically linked to diversity criteria such as increases in participation by renters, low- and moderate-income customers, and language isolated customers. Track and publicly report on program administrator-community partnership diversity criteria established and relevant outcomes on an annual basis.

Appendix A: EEACH EWG Recommendations

EEAC Equity Working Group Recommendations

Council-Approved Equity Recommendations 2/24/2021

PARTNERSHIPS

Enhance Community Partnerships

1. Ensure incentives and other means of support are adequate to meet partners' needs –
 - Provide guaranteed financial support at the beginning of the program year to support CBO and municipal staff capacity both internally and through their external partners
2. Tie partnership goals specifically to increases in participation by renters, moderate income customers, and language isolated customers, which is not currently the case for the Municipal Partnership Program
3. Enable more different and innovative pathways that partnerships could follow
 - Flexible, customized, and targeted approaches to better meet needs of individual communities and priorities within a community
4. Create goal-setting and evaluation mechanisms in collaboration with partners
5. Increase the number of participating municipalities and allow municipalities to submit multiyear applications
6. Increase access to, transparency around, and granularity of data by:
 - Standardizing data collection and reporting across all PAs
 - Developing data sharing agreements between program partners and PAs
 - Providing regular trainings to interested stakeholders on the Mass Save Data
 - Providing support and technical assistance to smaller community based organizations and municipalities as they navigate data
7. Streamline process and give program partners more flexibility to develop marketing materials that will resonate with their community

Develop Additional Pathways for Community Partnerships

8. Expand approach to partnerships to include entities other than municipalities such as,
 - Community-based and culturally based organizations (see next section of recommendations)
 - Statewide and regional organizations representing underserved communities and populations
 - Consider expansions beyond populations Equity Working Group has been focusing on
9. Ensure partnerships go beyond just outreach and lead to program participation
 - E.g., partners could serve as savings aggregators, project openers or closers, implementers

Invest in Community-based Partnerships

10. Identify and connect with local groups that work within underserved communities

11. Listen to community-identified needs
12. Include leaders in goal-setting and program planning
13. Identify and work with community leaders, with compensation for their time, experience, and knowledge
14. Provide resources on a sustained basis to achieve mutual energy efficiency objectives
15. Create regular mechanisms for two-way communication between partners and PAs

Prioritize Underserved Communities

16. Use quantitative information where available to determine geographic areas and population groups that should be targeted with partnerships
 - History of underservice
 - Income / energy burden
 - Language
 - Race or ethnicity
 - Environmental burdens

WORKFORCE DEVELOPMENT

Increase the Diversity of the Workforce Supporting Mass Save

- C. Assess and revise vendor solicitation processes
 - Minimize use of invite-only procurements
 - Include certified DBEs in all RFP, RFQ, and RFI distribution lists
 - Require bidders to make measurable financial commitments to do business with one or more diverse businesses on all procurement opportunities with a value greater than \$150,000
 - o Require lead vendors to partner with DBEs on all Mass Save contracts
 - Make selection criteria objective and transparent to avoid implicit bias
 - Host webinars and trainings, and provide technical assistance to help vendors navigate the procurement process
- D. Identify and remove barriers to increase Disadvantaged Business Enterprise (DBE) participation
 - Identify new DBE firms; support eligible vendors to pursue diversity certification or small business certification
- E. Set minimum standards for formal diversity, equity, and inclusion policies for all Mass Save contracted vendors
 - Provide detailed technical assistance to vendors as they develop formal diversity, equity, and inclusion policies
- F. Create and keep up-to-date a detailed list of all training opportunities available through or supported by Mass Save and make that list easily available to stakeholders and on the Mass Save website
 - Make a concerted effort to identify key upskilling opportunities for the incumbent workforce and develop new training opportunities where there are gaps

- Coordinate with the trade ally network and training providers to ensure that graduates of training programs have direct access to job opportunities with Mass Save contracted vendors
 - Expand geographic access to training opportunities by providing virtual and in-person trainings throughout the Commonwealth
- G.** Create targeted support for workforce and contractor development efforts in Environmental Justice communities with historically low participation in Mass Save
- Engage with community-based organizations and industry groups / associations that focus on diverse businesses

Attract and Train Young and Diverse Persons for Participation in the Energy Efficiency Workforce

- H.** Expand outreach & education about career opportunities to include stronger partnerships with vocational and technical high schools and community colleges
- Create multiple viable career pathways to illustrate career opportunities available to new entrants in the workforce
 - Establish energy efficiency career days where students can learn firsthand from energy efficiency workers
 - Make direct connections between careers in energy efficiency and climate and the environment
- I.** Fund internships, apprenticeships, pre-apprenticeships, and externships
- Partner with employers to offer partial wage subsidies for a limited time for new entrants into the energy efficiency workforce
 - Include mentorship and networking opportunities as a component of all internship, apprenticeship, pre-apprenticeship, and externship opportunities
 - Track and report the number of internships, pre-apprenticeships, apprenticeships, and externships that translate into full-time job offers

MODERATE-INCOME

Improve Qualification Process

- F.** Revise the income verification process to improve ease of access for moderate-income customers¹⁷

Enhance Incentives

¹⁷ Examples the EWG has discussed, but are not yet in agreement on how to proceed, include: Multiple options for income verification, such as automatic qualification in certain EJ communities/geographic areas (community level verification) or using self-verification with audits (household level verification) or other highly simplified verification processes. Establishing eligibility through documented participation in other state income-qualified programs.

- G. Provide no-cost incentives for weatherization, heating system replacements and appliance replacements to moderate-income customers¹⁸
 - Increase incentives to support electrification
 - Prioritize whole-building services to incentivize weatherization at the time of heating system replacement
- H. Increase and allocate sufficient funding for pre-weatherization barrier mitigation for moderate-income customers

RENTERS and LANDLORDS

Enhance Marketing and Outreach

1. Target municipalities with high numbers of rentals
2. Use multiple strategies to reach rental property owners and residents
 - Develop alternative sales and/or delivery models for rental property segment (e.g. landlord association, other third party)
3. Develop compelling case for participation by developing case studies when new program offerings become available

Improve Whole Building Services¹⁹

4. Collaborate with rental owners on program design
5. Address pre-weatherization barriers
6. Continue and enhance efforts to provide integrated service delivery with one point of contact for owner
7. Enhance incentives for measure bundles and / or for higher savings levels
8. Employ “closers” who get paid to close projects and / or revise Mass Save sales compensation model
9. Provide referral incentives to landlords and tenants who refer their landlords
10. Develop a marketing offer that combines energy efficiency and other building upgrades to attract new program participants

SMALL BUSINESS

Enhance Marketing and Outreach

1. Commit to prioritizing Main Streets programs in EJ communities in addition to and separate from efforts in business parks
2. Develop marketing and outreach strategies for commercial landlords to help commercial renters participate

¹⁸ The EWG continues to discuss this recommendation and plans to review budget, benefits, and participation data projections for increased incentives for moderate income customers.

¹⁹ Ensure coordination between the low-income and market rate multi-family programs.

3. Provide dedicated account managers for a subset of small business customers to allow for more personalized service – Consider grouping small business accounts by industry
4. Allow eligible customers to sign up online for turnkey small business audits
5. Expand pool of small business turnkey vendors that employ diverse staff

Prioritize Small Business Turnkey Program

6. Improve incentives and financing and standardize offering of turnkey services across PAs
7. Reduce reliance on upstream programs for small business
8. Enhance opportunities for deeper savings for underserved customers
9. Provide concierge services to guide customers through audit and installation

Emphasize Co-delivery of Lighting and Non-lighting Measures

10. Bundle lighting and non-lighting measures to deliver comprehensive solutions and deeper savings
11. Deliver more small business weatherization and address pre-weatherization barriers
 - Incorporate non-energy impacts in measure screening
12. Deliver more custom measures and compress the level of effort required to design a custom measure

LANGUAGE ISOLATED POPULATIONS

Understand the Customer Journeys of Language Isolated Populations

1. Create detailed customer journey maps
 - Illustrate individual journeys for each program within IES, Residential, and C&I, and for different customer types, including owners, tenants, property owners and managers
 - Identify all points of contact requiring translation and / or interpretation
 - Catalog language assets available within the Mass Save program administrators and contractor network
 - Use customer journey maps to establish appropriate expectations among contractors and customers
2. Identify gaps in resources and develop plan to bridge them through program outreach, design, delivery, and workforce development efforts

Facilitate Ease of Participation

3. Reduce number of steps required to access offers—participation should be seamless
4. Provide immediate pathways to action
5. Provide direct connections to services (e.g., utility supplies electrician to remedy issue) and energy concierge services
6. Collaborate with community-based organizations serving language isolated communities to standardize and socialize common industry terms

Develop Community-based Connections

7. Enhance connections with community-based groups
 - Identify and connect with statewide, regional, and local groups that work within language isolated communities
 - Create regular mechanisms for two-way communication
 - Listen to community-identified needs
 - Identify and work with community leaders, with compensation for their time, experience, and knowledge
 - Include community leaders in program planning
 - Provide resources on a sustained basis to achieve mutual energy efficiency objectives including financial incentives for lead generation and conversion
8. Leverage community networks to develop necessary cultural competence and build trust with language isolated communities
 - Support and use inclusive and multi-lingual media
 - Provide feedback on cultural aspects of marketing
 - Help with intersectional approaches

Focus on Multi-Lingual Workforce Development

9. Address gaps identified in language cataloging
10. Focus recruitment efforts to develop multilingual workforce for all levels
11. Recruit through community-based organizations
12. Create career ladders for multilingual staff; include pay differentials for language / cultural experience
13. Adapt to cultural differences within language groups, based on ethnicity, age, etc.

Develop Language Access

14. Establish written language access policy, preferably in common across all PAs and vendors, and provide regular training on language access
15. Maintain catalog of language capabilities of workforce, including PA staff and vendors
16. Create mechanisms for easy and equitable sharing of language support, including an MOU across PAs, lead vendors, subcontractors and regularly updated template for PA and vendor access language support

CROSS-CUTTING

Reporting

More frequent and detailed reporting of participation by underserved customer groups as described below.

1. **Small business**
 - Separate small business from C&I existing building retrofit reporting

- Expand reporting on small business participation
- 2. Language Isolated Populations**
 - Gather, track, and report customer language preference and language of program participants
- 3. Renters and Landlords**
 - Report renter participation quarterly
 - Report on program participation in small rental buildings (5-25 units)
 - Number of property owners/landlords receiving enhanced insulation incentive
 - Participation, savings, and costs for multifamily program, including # of affected projects and units
- 4. Moderate Income**
 - Provide regular information on barriers to weatherization
 - Number of heating equipment installations for moderate income customers, by type
- 5. Workforce**
 - Track and report on baseline levels, for vendors and employees, by relevant racial and/or cultural categories and at least annually report on progress over time. Include data on those enrolled in training and apprentice programs.

Targeting and Rewarding PA Performance

6. Designate PA budget and savings goals for rental properties, with targets for small buildings (525 units)
7. Establish numerical goals for increased participation among underserved customer groups such as moderate-income customers, renters and landlords, language isolated customers, and small businesses
8. Craft performance incentive mechanism that DPU can approve and that will emphasize equity and serving underserved customer groups

Appendix B: GJC Recommendations

June 15, 2021

Massachusetts Energy Efficiency Advisory Council

Commissioner Patrick Woodcock, Chair Massachusetts Department of Energy Resources 100 Cambridge Street, Suite 1020 Boston, MA 02114

RE: EEAC Recommendations for the 2022-2024 Massachusetts Three-Year Energy Efficiency Plans

Dear Commissioner Woodcock:

Every Massachusetts ratepayer pays into Mass Save but not everyone can easily access program benefits. For a just and resilient energy system, Mass Save must ensure equal access to low- and moderate-income households, immigrants, households not fluent in English, and renters.

The Green Justice Coalition brings together community and environmental justice organizations representing over 100,000 ratepayers across the Commonwealth. Like the Energy Efficiency Advisory Council (EEAC), the Green Justice Coalition (GJC) recognizes the importance of equitable participation and savings in energy efficiency programs.

Wealthy communities and homeowners access the Mass Save program [six to seven times](#) more than low-income, language-isolated, and environmental justice communities. Mass Save funds its energy efficiency programs with the utility bill contributions of all customers of investor-owned utilities in Massachusetts. The overall budget for the state's most recent three-year energy efficiency plan was \$2.8 billion—a considerable sum. Nonetheless, the major utilities companies, as well as independent policy analysts, have found that [“renters, lower-income residents, and non-English speakers are less likely to benefit”](#) from the program. Low-income households contribute a greater proportion of their income to the program, and environmental justice communities bear a greater proportion of the burden of our energy system.

This is a longstanding inequity to which many stakeholders, including the Green Justice Coalition, have drawn attention for over a decade. It will not change unless the EEAC issues explicit directives and requirements upon the Program Administrators (PAs).

Toward that end, the EEAC should consider the following recommendations:

- **Target communities currently underserved by Mass Save:**
 - Increase the income eligibility threshold from 60% to 80% of state median income
 - Direct additional resources to cities underutilizing Mass Save (such as Worcester, Springfield, and Lynn), low-income communities, communities impacted by COVID, and language-isolated communities
 - Fund and partner with trusted community organizations to increase participation in hard-to-reach communities

- Identify all points of contact requiring multilingual interaction and provide resources for translation, interpretation, and referral to contractors with relevant language competency
- Develop a multilingual workforce: apply workforce development and create career ladders for high-road jobs for multilingual and English learners who are experts in their communities and can help to improve access in language-isolated communities
- Providing funding for common pre-weatherization requirements facing low-income households, including roof repair, asbestos removal, knob and tube wiring removal, etc.
- Customize outreach and incentives to landlords in order to serve more renters
- **Expand program to include more forms of efficiency and resilience:**
 - Include housing retrofits, switching from oil or gas to electric heat pumps, more efficient appliance standards, etc.
 - Include the installation of electricity storage capacity to increase low-income community resilience to extreme weather events
- **Ensure transparency on energy efficiency equity goals, budgets and spending:** Officials should not support this plan unless there is explicit transparency on the changes made from the last plan (2019-2021), and greater clarity in terms of the equity goals, budget allocation and the policies and practices to reach low-income and language-isolated communities.
- **Expand program targets to match the scope of the Baker Administration’s Climate mandates:** The Baker-Polito Administration’s Clean Energy and Climate Plan calls for a million homes to receive energy efficiency retrofits by 2030. The scope of the draft Three-Year Plan falls far short of the 100,000+ homes per year that must receive these retrofits to reach this. To center equity in this approach, EEAC and the Mass Save program must prioritize the residences of Black, brown and low-income communities as the program expands to meet this mandate.

We urge officials to put disadvantaged and underserved communities first and reject any plan that does not center their needs wholly and transparently.

Alternatives for Community & Environment
 Boston Climate Action Network
 Chinese Progressive Association
 Clean Water Action
 Coalition for Social Justice
 Community Labor United
 GreenRoots
 Neighbor to Neighbor
 New Roots AME

The Green Justice Coalition (GJC) is a partnership of community-based, environmental, and labor allies who lead campaigns that have a meaningful impact on working-class people and communities of color. Together, our members organize and advocate for a just transition to a sustainable economy that allows our communities to achieve environmental and economic justice. GreenJusticeCoalition.org